

2+2 TRANSFER PLAN TO
UNIVERSITY OF HOUSTON-CLEAR LAKE

MATHEMATICAL SCIENCE

(B.A./B.S. at UHCL; A.A./A.S. at Community College \)

University-Required Transfer Courses

<u>Foot- notes</u>	<u>Core Curriculum Requirements*</u>	<u>Core #</u>	<u>4</u>	<u>Foot- notes</u>	<u>Program Foundation Courses*</u>	
a	ENGL 1301 - Composition I	3	10	a,#	ENGL 2311 – Technical Report Writing**	4
a	ENGL 1302 – Composition II	3	10	#	MATH 2414 – Calculus II	4
b	Humanities	3	40	j,#	MATH 2415 – Calculus III**	4
c	HIST 1301 – American History I	3	60	k	Elective	<u>3</u>
c	HIST 1302 – American History II, or HIST 2301,2302 or 2303 – Texas History	3	60			14
	GOVT 2301 – Government I	3	70			
	GOVT 2302 – Government II	3	70			
d,#	MATH 2413 – Calculus I	4	20	i	<u>Prerequisites &/or Remedial Courses</u>	
e	Visual & Performing Arts **	3	50	j	MATH 1316 – Trigonometry	3
f,#	Natural Science **	6	30		MATH 2312 or 2412 – Elem. Functions/Precalculus	4
g	Social & Behavioral Science **	3	80			
h	Speech Communication	3	11			
i,#	PASCAL, Ada, or Visual Basic	3	90			
		43*		l	<u>Additional Courses for the Associate Degree</u>	

Explanation of Footnotes

- \ Associate degree requirements at the community college, including the minimum allowed grade point average, are found in the community college catalog in effect during the student’s initial semester of continuous enrollment. See a community college counselor for more information. Please note that not all courses are offered at all community colleges. Check with your counselor for availability of courses on your campus.
- * UHCL’s requirements are consistent with the 42- hour Texas core curriculum. If a student completes a component of the core at one Texas institution, that block of courses will be substituted for UHCL’s same core component(s). Additional Program Foundation courses are required. **Please refer to your school’s core requirements for specific courses in each area below.**
- ** These courses may be fulfilled by approved upper-level equivalents at UHCL.
- # These courses are included in the Program Foundation Core and must be completed with a grade of “C-” or better.
- a Must complete six hours of Composition with grade of “C-” or better. Three hours of technical writing are required by the School of Science and Computer Engineering.
- b Suggested courses for Humanities include: any ENGL literature, HUMA, PHIL, RELI, SPCH or HIST (in addition to core requirements), or sophomore-level foreign language course.
- c Six hours of American History required; three hours may be in Texas History.
- d MATH 2413 may require prerequisites.
- e Suggested courses for Visual & performing Arts include: any ARTS, DANC, DRAM, MUSI, or MUAP course. Three semester hours credit required.
- f Suggested courses for Natural Science include: any ASTR, BIOL, CHEM, ESCI, GEOL, or PHYS course. PHYS 2425 & 2426 are recommended. Students planning to seek teacher certification should take one Biology and one Physics, Chemistry or Geology course.
- g Suggested courses for Social & Behavioral Science include: any ANTH, ECON, GEOG, PSYC, or SOCI course. Also any GOVT, HIST, or POLS course in addition to core requirements.
- h Suggested courses for Speech/Communication include: any SPCH course.
- i May choose from C++, C, JAVA, VISUAL BASIC, BASIC, FORTRAN, or PASCAL. These courses may have prerequisites.
- j **MATH 2415 (or MATH 3231, offered each Fall at UHCL) is required for both the B.A. and the B.S. programs.**
- k Any elective to meet university admission requirement of 54 hours of “C” or better (if needed).
- l With the exception of remedial courses, these courses will count toward the bachelor’s degree at UHCL as lower-level electives. These courses are either prerequisite courses for required university courses, courses required for the associate degree, or are required remedial courses to satisfy the TASP mandate
- 4 The core component number is used by Texas schools to identify which area of the 42-hour core curriculum a course fulfills.

University of Houston Clear Lake

SCHOOL OF SCIENCE AND COMPUTER ENGINEERING BACHELOR OF ARTS/BACHELOR OF SCIENCE IN MATHEMATICAL SCIENCE 2005-2006 CATALOG

GENERAL DEGREE REQUIREMENTS

- * A total of 123 semester hours of applicable college credit for the bachelor of arts degree; a minimum of 132 semester hours for the bachelor of science degree. A maximum of three hours of lower-level "activities" courses may be applied toward graduation. No more than 18 semester hours of previously earned lower-level credit may have been taken by correspondence, extension or CLEP.
- * At least 54 semester hours of upper-level work. Correspondence, extension or CLEP credit cannot be used to fulfill this requirement.
- * At least 30 hours of the degree program, including 12 hours in the major, must be taken in residence at UHCL.
- * A cumulative GPA of 2.000 on course work completed at UHCL with grades of "C" or better on at least 30 hours of resident upper-level work. Grades of "C-" and below cannot be applied toward the 30 hours of resident upper-level work.
- * Remain continuously enrolled (complete at least one course in a 12 month period) or meet requirements of a later catalog.
- * Complete the degree within seven years or meet requirements of a later catalog.

BASIC REQUIREMENTS

For the degree being pursued, program requirements listed on the transfer plan section of this document and indicated by the #sign should be completed with grades of "C-" or better before beginning the upper level program and finalizing a Candidate Plan of Study. All program core requirements must be completed with a grade of "C-" or better.

SCE PLAN CORE REQUIREMENTS for B.A. degree (15 hours)

If lower level credit is given for any of the following courses, additional upper-level course work selected from the list of electives will be required. In addition to Calculus I, II & III, students must complete the following courses:

MATH 3131 – Applied Linear Algebra	3 hrs
MATH 4434 – Intro to Probability	3 hrs
MATH 4030 – Intro. To Modern Algebra & Number Theory	3 hrs
MATH ELECTIVES required for B.A.	6 hrs

Math Electives require faculty approval, and may be selected from the following:

MATH 4031 – History of Mathematical Sciences	3 hrs	MATH 4231 – Predicate Logic	3 hrs
MATH 4132 – Number Theory	3 hrs	MATH 4232 – Abstract Algebra	3 hrs
MATH 4135 – Numerical Analysis	3 hrs	MATH 4235 – Theory of Models	3 hrs
MATH 4136 – Math Software Applications	3 hrs	MATH 4435 – Intro. To Statistics	3 hrs

SCE PLAN CORE REQUIREMENTS for B.S. degree (27 hours)

If lower level credit is given for any of the following courses, additional upper-level course work selected from the list of electives will be required. In addition to Calculus I, II & III, students must complete the following courses:

MATH 3131 – Applied Linear Algebra	3 hrs	MATH 4232 or 4435 – Abstract Algebra or Intro to Stats.	3 hrs
MATH 4434 – Introduction to Probability	3 hrs	MATH 4331 – Advanced Calculus	3 hrs
MATH 4131 – Ordinary Differential Equations & Appl.	3 hrs	Math Electives	9 hrs
MATH 4136 – Math Software Applications	3 hrs		

Math Electives require faculty approval, and may be selected from the following:

MATH 4132 – Number Theory	3 hrs	MATH 4235 – Theory of Models	3 hrs
MATH 4133 – Topology	3 hrs	MATH 4431 – Introduction to Analysis	3 hrs
MATH 4231 – Predicate Logic	3 hrs	MATH 4633 – Functions of a Complex Variable	3 hrs
MATH 4232 – Abstract Algebra	3 hrs	MATH 4435 – Introduction to Statistics	3 hrs
The balance of required hrs may consist of approved electives.		MATH 4135 – Numerical Analysis	3 hrs

ADDITIONAL COURSES NECESSARY TO MEET UPPER-LEVEL REQUIREMENT OR TO MEET MINIMUM REQUIRED HOURS FOR GRADUATION: _____

School of Science and Computer Engineering Advising Office (281) 283-3711, Bayou Bldg., Room 3611
Advisors: Barbara Coleman and Dorothy Hogg
e-mail: sceadvising@uhcl.edu www.uhcl.edu/sce